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REMARKS

This is a full and timely response to the outstanding Office action mailed December 12, 2005. Upon entry of the amendments in this response claims 1-16 are pending. More specifically, claims 1, 6, 11, and 16 are amended. These amendments are specifically described hereinafter.

I. Present Status of Patent Application

Claims 1-16 are rejected under 35 U.S.C. 112, first paragraph, as allegedly failing to comply with the enablement requirement. Claims 1, 2, 6, 7, 11, 12, and 17? are rejected under 35 U.S.C. 103(a) as allegedly being unpatentable over *Jiang, et al* (U.S. Patent No. 6,385,641) in view of *Pirolli, et al* (U.S. Patent No. 6,098,064) in further view of *Adar, et al* (U.S. Patent No. 6,493,702). Claims 3-5, 8-10, and 13-16 are rejected under 35 U.S.C. 103(a) as allegedly being unpatentable over *Jiang, et al* (U.S. Patent No. 6,385,641), *Pirolli, et al* (U.S. Patent No. 6,098,064), *Adar, et al* (U.S. Patent No. 6,493,702) in view of *Barrett, et al* (U.S. Patent No. 5,727,129). To the extent that these rejections have not been rendered moot by the cancellation of claims, they are respectfully traversed.

II. Examiner Interview

Applicant first wishes to express sincere appreciation for the time that Examiner Chankong spent with Applicant's representatives Chuck Griggers and Benjie Balser during a January 23, 2006, telephone discussion regarding the above-identified Office Action. Applicant believes that various features described in the patent application and recited in the claims, including enabling the storage on multiple layers, were discussed during the telephone discussion, and that the outcome of this discussion is addressed herein. During that conversation, Examiner Chankong seemed to indicate that it would be potentially beneficial for Applicant to file this amendment and response. Thus, Applicant respectfully requests that Examiner Chankong carefully consider this amendment and response.

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III. Rejections Under 35 U.S.C. §112, First Paragraph

A. <u>Claims 1-16</u>

The Office Action rejects claims 1-16 under 35 U.S.C. §112, First Paragraph as allegedly failing to comply with the enablement requirement. Independent claims 1, 6, 11, and 16 define a multi-layer architecture as comprising a client device and a server device. The term "all layers" in each independent claim has been amended to "both the client device layer and the server device layer" to meet the enablement requirement of §112, First Paragraph.

Applicant respectfully submits that the foregoing amendments have been made for purposes of clarification in response to the rejections made under 35 U.S.C. §112, and not in response to the rejections based upon any of the references of record. Indeed, Applicant submits that no substantive limitations have been added to the claims. Therefore, no prosecution history estoppel arises from these amendments. Applicant also respectfully submits that the amendments do not raise new issues that would require a new search and that they should, accordingly, be entered.

IV. Rejections Under 35 U.S.C. §103(a)

A. Claims 1-5

The Office Action rejects claims 1-5 under 35 U.S.C. §103(a) as allegedly being unpatentable over *Jiang, et al* (U.S. Patent No. 6,385,641) in view of *Pirolli, et al* (U.S. Patent No. 6,098,064) in further view of *Adar, et al* (U.S. Patent No. 6,493,702) in further view of *Barrett, et al* (U.S. Patent No. 5,727,129). For at least the reasons set forth below, Applicant respectfully traverses the rejection.

Independent claim 1 as amended recites:

1. A system for facilitating communication between a user and a network of information items, comprising:

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a remote data storage device for storing the information items, wherein the information items are stored in the form of pages, and wherein the pages contain a plurality of links to other information items;

a multi-layer architecture comprising:

- a client device having a user interface program thereon, for allowing a user to interface with the network and request the information items; and
- a server device, in communication with the client device and in communication with the remote storage device, for handling information requests from multiple clients and for storing information retrieved from the data storage devices locally in a server cache memory;
- a data collection module for collecting and storing successive actions of a particular authenticated user; and
- a probability module in communication with the data collection module for calculating a probability for the desirability of the links by the particular user and for comparing the probability to a predetermined threshold value to identify predicted links and for retrieving the predicted information items associated with the links from the remote data storage devices and enabling the storage of the predicted information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items.

(Emphasis added).

For a proper rejection of a claim under 35 U.S.C. §103, the cited combination of references must disclose, teach, or suggest all elements/features/steps of the claim at issue. See, e.g., In re Dow Chemical, 5 U.S.P.Q.2d 1529, 1531 (Fed. Cir. 1988) and In re Keller, 208 U.S.P.Q.2d 871, 881 (C.C.P.A. 1981). Applicant respectfully submits that independent claim 1 is allowable for at

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least the reason that the combination of Jiang, Pirolli, Adar, and Barrett does not disclose, teach, or suggest at least enabling the storage of the predicted information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items. Even if Pirolli teaches that the storage of the predicted information may be enabled on multiple levels, Pirolli teaches away from calculating the probability for a particular user. "[T]he P&C module 202 in the proxy server 112...and server 104...compute a collective context Q for a community of client computers as opposed to an individual context Q for a single computer." See Pirolli, col. 11, lines 22-26. Since Pirolli teaches away from a probability calculation for a particular user in a multi-layer architecture, using Pirolli in a combination of references is improper.

As the cited combination of references does not disclose, teach, or suggest, either implicitly or explicitly, all the elements of claim 1, the rejection should be withdrawn.

Additionally and notwithstanding the analysis hereinabove, there are other reasons why claim 1 is allowable.

Because independent claim 1 is allowable over the cited references of record, dependent claims 2-5 (which depend from independent claim 1) are allowable as a matter of law for at least the reason that dependent claims 2-5 contain all the steps/features of independent claim 1. See Minnesota Mining and Manufacturing Co. v. Chemque, Inc., 303 F.3d 1294, 1299 (Fed. Cir. 2002) Jeneric/Pentron, Inc. v. Dillon Co., 205 F.3d 1377, 54 U.S.P.Q.2d 1086 (Fed. Cir. 2000); Wahpeton Canvas Co. v. Frontier Inc., 870 F.2d 1546, 10 U.S.P.Q.2d 1201 (Fed. Cir. 1989). Therefore, the rejection to claims 2-5 should be withdrawn and the claims allowed.

Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claims 2-5 recite further features and/or combinations of features, as are apparent by examination of the claims themselves, that are patently distinct from the cited references of record. Hence there are other reasons why dependent claims 2-5 are allowable.

Additionally, with regard to the rejection of claims 1-5, none of *Jiang, Adar*, or *Barrett* make up for the deficiencies of *Pirolli* noted above. Therefore, claims 1-5 are considered patentable over any combination of these documents.

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Moreover, the Office action has included a conclusion that "[t]he use of proxy servers is well known and ubiquitous in the art for providing a centralized means for storing user information and enable users to access their cached pages from any computer that is attached to the proxy." See Office Action, page 4, section 5. Applicants appreciate the clarification that this statement is not along the lines of an "Official Notice", but the result of a teaching cited in the Pirolli reference. However, to forestall any inference that the usage of terms like "well-known and ubiquitous" might provide, Applicants again traverse this finding that the subject matter is well known and ubiquitous. Particularly in the context of the claimed combination that includes a data collection module for collecting and storing successive actions of a particular authenticated user and a probability module in communication with the data collection module for calculating a probability for the desirability of the links by the particular user, the subject matter alleged to be well-known is too complex for a reasonably skilled person to consider it to be well-known to the point that no additional evidence is needed. Therefore, the well-known conclusion is improper and should be withdrawn.

B. Claims 6-10

The Office Action rejects claims 6-10 under 35 U.S.C. §103(a) as allegedly being unpatentable over *Jiang*, et al (U.S. Patent No. 6,385,641) in view of *Pirolli*, et al (U.S. Patent No. 6,098,064) in further view of *Adar*, et al (U.S. Patent No. 6,493,702) in further view of *Barrett*, et al (U.S. Patent No. 5,727,129). For at least the reasons set forth below, Applicant respectfully traverses the rejection.

Independent claim 6 as amended recites:

6. A method for facilitating communication between a user and a network of information items, comprising:

providing a multi-layer architecture comprising a client device and a server device;

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- storing the information items on a remote data storage device, wherein the information items are stored in the form of pages, and wherein the pages contain a plurality of links to other information items;
- configuring the client device having a user interface program thereon, to allow a user to interface with the network and request a download of the information items;
- configuring the server device for handling information requests from multiple clients and for storing information retrieved from the data storage devices locally in server cache memory;
- collecting and storing successive actions of an authenticated particular user; calculating a probability for the links associated with the successive actions of the authenticated particular user;
- comparing the probability to a predetermined threshold value;
- retrieving the information items associated with the links from the remote data storage devices; and
- enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items.

(Emphasis added).

For a proper rejection of a claim under 35 U.S.C. §103, the cited combination of references must disclose, teach, or suggest all elements/features/steps of the claim at issue. Applicant respectfully submits that independent claim 6 is allowable for at least the reason that the combination of Jiang, Pirolli, Adar, and Barrett does not disclose, teach, or suggest at least enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items. Even if Pirolli teaches that the storage of the predicted information may be enabled on multiple levels, Pirolli teaches away from calculating the probability for a particular user. "[T]he P&C module 202 in the proxy server 112...and server

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104...compute a collective context Q for a community of client computers as opposed to an individual context Q for a single computer." See *Pirolli*, col. 11, lines 22-26. Since *Pirolli* teaches away from a probability calculation for a particular user in a multi-layer architecture, using *Pirolli* in a combination of references is improper.

As the cited combination of references does not disclose, teach, or suggest, either implicitly or explicitly, all the elements of claim 6, the rejection should be withdrawn.

Additionally and notwithstanding the analysis hereinabove, there are other reasons why claim 6 is allowable.

Because independent claim 6 is allowable over the cited references of record, dependent claims 7-10 (which depend from independent claim 6) are allowable as a matter of law for at least the reason that dependent claims 7-10 contain all the steps/features of independent claim 6. Therefore, the rejection to claims 7-10 should be withdrawn and the claims allowed.

Additionally and notwithstanding the foregoing reasons for allowability of independent claim 6, dependent claims 7-10 recite further features and/or combinations of features, as are apparent by examination of the claims themselves, that are patently distinct from the cited references of record. Hence there are other reasons why dependent claims 7-10 are allowable.

Additionally, with regard to the rejection of claims 6-10, none of *Jiang, Adar*, or *Barrett* make up for the deficiencies of *Pirolli* noted above. Therefore, claims 6-10 are considered patentable over any combination of these documents.

C. <u>Claims 11-15</u>

The Office Action rejects claims 11-15 under 35 U.S.C. §103(a) as allegedly being unpatentable over *Jiang, et al* (U.S. Patent No. 6,385,641) in view of *Pirolli, et al* (U.S. Patent No. 6,098,064) in further view of *Adar, et al* (U.S. Patent No. 6,493,702) in further view of *Barrett, et al* (U.S. Patent No. 5,727,129). For at least the reasons set forth below, Applicant respectfully traverses the rejection.

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Independent claim 11 as amended recites:

- 11. A method for facilitating communication between a user and a network of information items, comprising:
 - means for providing a multi-layer architecture comprising a client device and a server device;
 - means for storing the information items on a remote data storage device, wherein the information items are stored in the form of pages, and wherein the pages contain a plurality of links to other information items;
 - means for configuring the client device having a user interface program thereon, to allow a user to interface with the network and request a download of the information items;
 - means for configuring the server device for handling information requests from multiple clients and for storing information retrieved from the data storage devices locally in server cache memory;
 - means for collecting and storing successive actions of an authenticated particular user;
 - means for calculating a probability for the links associated with the successive actions of the authenticated particular user;
 - means for comparing the probability to a predetermined threshold value;
 - means for retrieving the information items associated with the links from the remote data storage devices; and
 - means for enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items.

(Emphasis added).

For a proper rejection of a claim under 35 U.S.C. §103, the cited combination of references must disclose, teach, or suggest all elements/features/steps of the claim at issue. Applicant

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respectfully submits that independent claim 11 is allowable for at least the reason that the combination of Jiang, Pirolli, Adar, and Barrett does not disclose, teach, or suggest at least means for enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items. Even if Pirolli teaches that the storage of the predicted information may be enabled on multiple levels, Pirolli teaches away from calculating the probability for a particular user. "[T]he P&C module 202 in the proxy server 112...and server 104...compute a collective context Q for a community of client computers as opposed to an individual context Q for a single computer." See Pirolli, col. 11, lines 22-26. Since Pirolli teaches away from a probability calculation for a particular user in a multi-layer architecture, using Pirolli in a combination of references is improper.

As the cited combination of references does not disclose, teach, or suggest, either implicitly or explicitly, all the elements of claim 11, the rejection should be withdrawn.

Additionally and notwithstanding the analysis hereinabove, there are other reasons why claim 11 is allowable.

Because independent claim 11 is allowable over the cited references of record, dependent claims 12-15 (which depend from independent claim 11) are allowable as a matter of law for at least the reason that dependent claims 12-15 contain all the steps/features of independent claim 11. Therefore, the rejection to claims 12-15 should be withdrawn and the claims allowed.

Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claims 12-15 recite further features and/or combinations of features, as are apparent by examination of the claims themselves, that are patently distinct from the cited references of record. Hence there are other reasons why dependent claims 12-15 are allowable.

Additionally, with regard to the rejection of claims 11-15, none of *Jiang, Adar*, or *Barrett* make up for the deficiencies of *Pirolli* noted above. Therefore, claims 11-15 are considered patentable over any combination of these documents.

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D. Claim 16

The Office Action rejects claim 16 under 35 U.S.C. §103(a) as allegedly being unpatentable over *Jiang, et al* (U.S. Patent No. 6,385,641) in view of *Pirolli, et al* (U.S. Patent No. 6,098,064) in further view of *Adar, et al* (U.S. Patent No. 6,493,702) in further view of *Barrett, et al* (U.S. Patent No. 5,727,129). For at least the reasons set forth below, Applicant respectfully traverses the rejection.

Independent claim 16 as amended recites:

- 16. A first network for facilitating communication between a user and a network of information items, comprising:
 - a remote data storage device for storing the information items, wherein the information items are stored in the form of pages, and wherein the pages contain a plurality of links to other information items;
 - a multi-layer architecture comprising:
 - a client device having a user interface program thereon, for allowing a user to interface with the network and request a download of the information items;
 - a server device, in communication with the client device and in communication with the remote storage device, for handling information requests from multiple clients and for storing information retrieved from the data storage devices locally in server cache memory; and

the first network:

- a data collection module for collecting and storing successive actions of an authenticated particular user; and
- a probability module in communication with the data collection module for calculating a probability for the links associated with the successive actions of the authenticated particular user, and for comparing the probability to a predetermined threshold value, and for retrieving the

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information items associated with the links from the remote data storage devices and enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items;

- wherein the probability module updates the probabilities assigned to the links with each successive user activity;
- wherein the probability module aborts retrieving the predicted information items if the user requests an information item other than the predicted information items;
- wherein the probability module continues retrieving the predicted information items from the remote data storage devices and storing the predicted information items in the server cache memory if the user requests the predicted information item; and
- wherein the probability module downloads the user requested information item to the client from the server cache memory.

(Emphasis added).

For a proper rejection of a claim under 35 U.S.C. §103, the cited combination of references must disclose, teach, or suggest all elements/features/steps of the claim at issue. Applicant respectfully submits that independent claim 16 is allowable for at least the reason that the combination of Jiang, Pirolli, Adar, and Barrett does not disclose, teach, or suggest at least enabling the storage of the information items on both the client device layer and the server device layer of the multi-layer architecture in advance of the particular user's request for the selected information items. Even if Pirolli teaches that the storage of the predicted information may be enabled on multiple levels, Pirolli teaches away from calculating the probability for a particular user. "[T]he P&C module 202 in the proxy server 112...and server 104...compute a collective context Q for a community of client computers as opposed to an individual context Q for a single computer." See Pirolli, col. 11, lines 22-26. Since Pirolli

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teaches away from a probability calculation for a particular user in a multi-layer architecture, using *Pirolli* in a combination of references is improper.

As the cited combination of references does not disclose, teach, or suggest, either implicitly or explicitly, all the elements of claim 16, the rejection should be withdrawn.

Additionally and notwithstanding the analysis hereinabove, there are other reasons why claim 16 is allowable.

Additionally, with regard to the rejection of claim 16, none of *Jiang*, *Adar*, or *Barrett* make up for the deficiencies of *Pirolli* noted above. Therefore, claim 16 is considered patentable over any combination of these documents.

V. <u>Miscellaneous Issues</u>

Any other statements in the Office Action that are not explicitly addressed herein are not intended to be admitted. In addition, any and all findings of inherency are traversed as not having been shown to be necessarily present. Furthermore, any and all findings of well-known art and official notice, or statements interpreted similarly, should not be considered well known for at least the specific and particular reason that the Office Action does not include specific factual findings predicated on sound technical and scientific reasoning to support such conclusions.

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CONCLUSION

In light of the foregoing amendments and for at least the reasons set forth above, Applicant respectfully submits that all objections and/or rejections have been traversed, rendered moot, and/or accommodated, and that the now pending claims 1-16 are in condition for allowance. Favorable reconsideration and allowance of the present application and all pending claims are hereby courteously requested. If, in the opinion of the Examiner, a telephonic conference would expedite the examination of this matter, the Examiner is invited to call the undersigned agent at (770) 933-9500.

Respectfully submitted.

yester. Reg. No. 34,367

THOMAS, KAYDEN, HORSTEMEYER & RISLEY, L.L.P. Suite 1750 100 Galleria Parkway N.W. Atlanta, Georgia 30339 (770) 933-9500

Customer No.: 38823